



CITY OF FERNLEY

CITY COUNCIL AGENDA REPORT

Meeting Date: June 16, 2021

REPORT TO:	Mayor & City Council
REPORT THRU:	Daphne Hooper, City Manager
REPORT BY:	Tim Thompson, Planning Director
REVIEWED BY:	Denise Lewis, Finance Director

FINANCIAL IMPACT: <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO	CURRENTLY BUDGETED: <input type="checkbox"/> YES <input type="checkbox"/> NO <input checked="" type="checkbox"/> N/A	FUND/ACCOUNT:
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ACTION REQUESTED:	<input type="checkbox"/> Consent	<input checked="" type="checkbox"/> Motion	<input type="checkbox"/> Ordinance
	<input type="checkbox"/> Presentation	<input type="checkbox"/> Receive/File	<input type="checkbox"/> Resolution

AGENDA ITEM: Public Hearing, Conditional Use Permit – CUP21003 (FOR POSSIBLE ACTION)
 Consideration and possible action on a Conditional Use Permit, pursuant to Nevada Revised Statutes 278.147, to allow a facility where an explosive, a highly hazardous substance, or other hazardous substances are used, manufactured, processed, transferred or stored and the construction of 3 individual buildings totaling approximately 100,000 square feet (Lithium-Ion Battery Recycling Pilot Plant) in the I (Industrial) zoning district on a site approximately 12.44 acres in size located at 345 Winston Lane, Fernley, Nevada. (APNs: 021-071-45)

AGENDA ITEM BRIEF: The applicant is requesting a Conditional Use Permit to allow for the construction of 3 individual buildings in the Industrial (I) zoning district for a lithium-ion battery recycling pilot plant.

RECOMMENDED MOTION:
 The Planning Commission forwarded a recommendation of approval.

Motion to Approve:
 “I move to approve the Conditional Use Permit associated with CUP21003, adopting Finding CU1 through CU8 and the facts supporting these Findings as set forth in the staff report and subject to the Conditions of Approval 1 through 31 as listed in the staff report.”

Alternatives:
 The City Council may choose to deny the application based on information received in written materials and at the public hearings on this matter. The City Council’s inability to make any Finding(s) should be explicitly described.

Business Impact (per NRS Chapter 237):

A Business Impact Statement is Attached.

A Business Impact Statement is not required because this is not a rule (term excludes vehicles by which legislative powers are exercised under NRS Chapters 271, 278, 278A, or 278B.

See Attached Report for Background/Analysis/Alternatives.

PROJECT SUMMARY

- CASE NUMBER(S):** • CUP21003
- REQUESTED ACTION(S):** • Conditional Use Permit
- PROJECT DESCRIPTION:** • American Battery Metal Company proposes to construct a lithium-ion battery recycling pilot plant. The entire plant will consist of three (3) functional building areas totaling 98,789.4 square feet of floor space. The three (3) functional building spaces include a production building, an office building with laboratories, and a warehouse. The purpose of the Project is to demonstrate commercialized deployment of ABMC'S closed-loop technology platform that recycles lithium-ion battery materials.
- PROPERTY OWNER(s):** • American Battery Metals Corporation
- APPLICANT:** • American Battery Metals Corporation
- LOCATION:** • 345 Winston St Fernley, Nevada
• APN: 021-071-45
- SITE SIZE:** • ± 12.44 acres
- EXISTING ZONING:** • Industrial
- EXISTING LAND USE:** • Industrial
- WARD INFORMATION:** • Ward 1 – Raymond Lacy

***A PUBLIC HEARING IS REQUIRED**

POLICY REFERENCE

Nevada Statutes: NRS 278A
Fernley Municipal Code: Title 32
Policies & Procedure Manual: N/A
Community Assessment: N/A
City of Fernley Development Code: Chapter 32.03 – Administration
Chapter 32.06 – Zoning Districts
Chapter 32.09 – Development Standards
Chapter 32.12 – Adequate Public Facilities

BACKGROUND

The parcel of land proposed for development by the American Battery Metals Corporation (ABMC) is currently zoned for industrial. Records show there has not been any entitlements since 1971. The property was acquired by MAR LLC on 3 November 2004 until eventually being sold to American Battery Metals Corporation on 10 October 2020.

ANALYSIS

This applicant is seeking approval for a Conditional Use Permit to allow for the construction of a lithium-ion battery recycling pilot plant. The entire plant will consist of three (3) functional building areas totaling 98,789.4 square feet of floor space. The three (3) functional building spaces include a production building, an office building with laboratories, and a warehouse. The purpose of the Project is to demonstrate commercialized deployment of ABMC'S closed-loop technology platform that recycles lithium-ion battery materials. The purpose of the Conditional Use Permit is to promote *"the public health, safety and general welfare by providing for special safeguards in the location and design of certain uses in certain zoning districts."* A Conditional Use Permit is a discretionary permit requiring a decision-making body to exercise judgment prior to its approval, conditional approval, or denial. The process encourages public review and evaluation of a proposed use's operating characteristics and/or site development features and is intended to ensure that proposed conditional uses will not have a significant adverse impact on surrounding uses or the community-at-large.

The project consists of a battery recycling plant on a 12.44-acre property. The project is set to connect the city's water infrastructure. The proposed site is located on Logan Lane, adjacent to the American Ready Mix concrete plant and less than a mile from the Pilot Road / Main Street (SR 427) intersection. Access is proposed via two access roads on Logan Lane. Primary ingress will be via the American Ready Mix access road on the east side of the site, and primary egress will be via a new access road on the west side of the site.

According to the Clean Energy Institute at the University of Washington:

"A lithium-ion (Li-ion) battery is an advanced battery technology that uses lithium ions as a key component of its electrochemistry. During a discharge cycle, lithium atoms in the anode are ionized and separated from their electrons. The lithium ions move from the anode and pass through the electrolyte until they reach the cathode, where they recombine with their electrons and electrically neutralize. The lithium ions are small enough to be able to move through a micro-permeable separator between the anode and cathode. In part because of lithium's small size (third only to hydrogen and helium), Li-ion batteries are capable of having a very high voltage and charge storage per unit mass and unit volume.

Li-ion batteries can use a number of different materials as electrodes. The most common combination is that of lithium cobalt oxide (cathode) and graphite (anode), which is most commonly found in portable electronic devices such as cellphones and laptops. Other cathode materials include lithium manganese oxide (used in hybrid electric and electric automobiles) and lithium iron phosphate. Li-ion batteries typically use ether (a class of organic compounds) as an electrolyte."

According to the United States Department of Environmental Protection, *“the material composition, or “chemistry,” of a battery is tailored to its intended use. Li-ion batteries are used in many different applications and many different environmental conditions. Some batteries are designed to provide a small amount of energy for a long time, such as operating a cellphone, while others must provide larger amounts of energy for a shorter period, such as in a power tool. Li-ion battery chemistry can also be tailored to maximize the battery’s charging cycles or to allow it to operate in extreme heat or cold. In addition, technological innovation also leads to new chemistries of batteries being used over time. Batteries commonly contain materials such as lithium, cobalt, nickel, manganese, and titanium, as well as graphite and a flammable electrolyte. However, there is always on-going research into developing Li-ion batteries that are less hazardous or that meet the requirements for new applications.”*

The United States Environmental Protection Agency (EPA) encourages the recycling of Li-ion batteries. *“Reusing and recycling Li-ion batteries helps conserve natural resources by reducing the need for virgin materials and reducing the energy and pollution associated with making new products. Li-ion batteries contain some materials such as cobalt and lithium that are considered critical minerals and require energy to mine and manufacture. When a battery is thrown away, we lose those resources outright—they can never be recovered. Recycling the batteries avoids air and water pollution, as well as greenhouse gas emissions. It also prevents batteries from being sent to facilities that are not equipped to safely manage them and where they could become a fire hazard. You can reduce the environmental impact of electronics that are powered by Li-ion batteries at the end of their useful life through the reuse, donation and recycling of the products that contained them.”*

The purpose of the proposed project is to demonstrate commercialized deployment of the applicant’s closed-loop technology platform that recycles lithium-ion battery materials. This process is proprietary and specific information regarding the process was not provided to staff. It should also be acknowledged that City Staff are not subject matter experts regarding the operation and regulations associated with the proposed project. The City will rely heavily on our state and federal partner agencies including but not limited to, the United States Environmental Protection Agency (EPA), the Nevada Division of Environmental Protection (NDEP), the Nevada State Fire Marshall, and the North Lyon County Fire Protection District. Nevada Revised Statutes 278.147 requires a Conditional Use Permit for facilities where an explosive, a highly hazardous substance, or other hazardous substances are used, manufactured, processed, transferred or stored. Because the process is proprietary, it is difficult to specifically determine the nature of potentially hazardous substances. However, research indicates that transport and storage of lithium-ion batteries is potentially hazardous.

According to the Pipeline and Hazardous Materials Safety Administration (PHMSA) of the United States Department of Transportation, *“lithium batteries present both chemical and electrical hazards. Dangers include chemical burn, fire, and electrical shock. Batteries can be dangerous if not safely packaged and handled when transported. Misused, mishandled, improperly packaged, improperly stored, overcharged, or defective batteries can short circuit, overheat, and sometimes cause a fire. Most lithium batteries manufactured today contain a flammable electrolyte and have a higher energy density. They can overheat and ignite under certain conditions and, once ignited, can be difficult to extinguish. In addition, although an infrequent event, a lithium battery is susceptible to thermal runaway, a chain reaction leading to a violent release of its stored energy.”*

Since lithium batteries are designed to provide high levels of power, the electrical energy in these batteries is significant, meaning that such batteries can sometimes generate a great amount of heat if short-circuited. In addition, the chemical content of lithium batteries may catch fire if damaged or if improperly designed or assembled. For these safety reasons they are classified as dangerous goods and special transport regulations apply. Lithium batteries are classified as class 9 miscellaneous dangerous goods and should be handled with care. The largest environmental harm that comes with lithium ion-batteries is how they are disposed of. According to the American Battery Metals Corporation they have developed a method of recycling the lithium-ion batteries that creates no-waste, is economical, and is an environmentally sustainable system. Based on the materials submitted with the application, the company may use corrosive chemicals to disintegrate and separate the batteries. With the introduction of volatile chemicals poses another risk of potential chemical spills/leaks. In the event of a chemical leak the immediate area is subject to hazards. These potential hazards may include soil, air, and water contamination or immediate harm to plant employees.

The use and practices of this site will be regulated by any federal, state, or local agency with jurisdiction over the project to the approval of the administrator. Based on the information provided with the application and after consulting with the Nevada Division of Environmental Protection, the chemicals described in the facility are reportable in the state and federally. The Nevada Hazmat Program is a reporting system that takes care of both Federal and State chemicals. The Federal Superfund Amendments and Reauthorization Act (SARA) was passed in 1986. Title III of SARA is a freestanding statute titled the Emergency Planning and Community Right-To-Know Act (EPCRA). Among other requirements, EPCRA directed each state to establish a state emergency response commission (SERC) and local emergency planning committees (LEPCs) as repositories for community right-to-know information. Section 312 of this federal statute requires covered facilities to submit hazardous chemical inventory forms annually. Facilities subject to the U.S. Occupational Safety and Health Administration (OSHA) Hazard Communication Standard must annually provide chemical information to the state emergency response commission, the local emergency planning committee and the local fire department. Information is required for the hazardous substances at the facility during the preceding calendar year and includes the quantity and location of hazardous chemicals they store or use onsite above the threshold planning quantity. Also required are the categories of each chemical's physical and health hazards.

Additionally, the combustibility potential of lithium batteries that may lead to a fire or explosion. Lithium batteries can be sensitive when exposed to extreme temperatures or failure to follow manufacturers' recommendations when charging a device or battery leading to overheating or explosive consequences. A common cause of fire/explosion is when the batteries are subject to physical impacts which leads to immediate combustion.

To safeguard the public health, safety, and welfare, conditions of approval have been included which require the applicant to comply with any and all local, state, and federal laws applicable to the facility. The facility may also be subject to the Resource Conservation and Recovery Act (RCRA) and the Nevada Division of Environmental Protection's Chemical Accident Prevention Program (CAPP) and has been conditioned accordingly. It should be noted that any violation of the Conditions of Approval may result in the revocation of this Conditional Use Permit subject to the provisions outlined in Chapter 32.03 of the Fernley Municipal Code.

The International Fire Code (IFC) requires industrial facilities to provide a secondary emergency access. This is especially important because there are uncontrolled Union Pacific Railroad (UPRR) tracks which cross Logan Lane. The applicant has been conditioned to secure a secondary emergency access. The access and any easements shall be secured prior to the issuance of a building permit for the project. The emergency access road shall be improved, at a minimum, to standards within the Public Works Design Manual to the approval of the North Lyon County Fire Protection District, Public Works Director, City Engineer, and Administrator.

The project site is located within a source water protection area as identified in the Source Water Protection Plan.

A hydrology study was conducted for the American Battery project and the on-site hydrology shows that the proposed collection system can collect and retain all the runoff generated by the development. All flows caught on-site are directed to the proposed retention ponds. The storm drain system is designed to fully collect and retain all flows generated from the development during a 100-year storm event.

According to the sewer report conducted the proposed American Battery Lithium-Ion Battery recycling plant will generate an estimated 64,985 gallons per day. This takes into account the discharge generated by the fixtures in the buildings as well as the discharge generated by production. Service laterals from the office/lab, production, and storage buildings will convey the discharge through mains, on-site, and connect to the existing system on Logan Lane. It is expected that a new sanitary sewer lift station may have to be built to replace the existing one serving the American Ready-Mix Plant. Final design for the offsite public sanitary sewer system will be done by the City of Fernley.

A Traffic Impact Study was conducted to evaluate the potential traffic impacts associated with the development of the proposed ABMC facility in Fernley, NV. This study was undertaken to determine the existing and future traffic conditions, quantify traffic volumes generated by the proposed project, identify potential impacts, and develop recommendations to mitigate impacts, if any are found. The proposed project is anticipated to generate 475 daily trips, 48 AM peak hour trips, and 39 PM peak hour trips. The side street movements at the Pilot Road / Logan Lane / Main Street (SR 427) intersection (primarily the Pilot Road eastbound approach) operate beyond the level of service threshold *without* the project traffic. The addition of project traffic is relatively minor and has insignificant impact on the overall intersection operations. All other intersections operate within the level of service policy.

There are no specific requirements to improve the Pilot Road/Logan Lane/Main Street (SR 427) intersection as result of this project. However, the developer has been required to consult with the Nevada Department of Transportation and pay a fair share contribution for any future improvements to the intersection.

Should the Planning Commission determine the project, as submitted and conditioned, is consistent with the existing surrounding land uses, will not have a significant adverse impact on the existing surrounding uses, promotes the public health, safety, and general welfare, and can make the applicable Findings, the Planning Commission can approve the item with the attached conditions of approval.

If the Planning Commission cannot make some or all of the applicable Findings and determines the project is not consistent with the existing surrounding uses, will have a significant adverse impact on the existing uses, and/or does not promote the public health, safety and general welfare, the Planning Commission could deny the application. The motion to deny should be based on information received

in written materials and at the public hearings on this matter and the City Council's inability to make any Finding(s) should be explicitly described.

FINDINGS

CU1. The proposal, as submitted and conditioned, is in compliance with the Comprehensive Master Plan.

Relationship to the Master Plan

1. Industrial (I)

The proposed development is located within an area designated as Industrial in the city's Comprehensive Master Plan. Per the Comprehensive Master Plan, Industrial zoning focuses on industrial uses such as manufacturing/warehousing, maintenance and repair shops, distribution, mining, storage and construction. Other uses for industrial can be supporting railroad uses and limited support services for the convenience of employees, such as restaurants, small scale retail, and professional and medical offices.

The Comprehensive Master Plan goes on to state that Industrial zones are typically located near major transportation corridors but isolated from residential land uses.

2. The Land Use Plan Goals and Action Strategies in the 2018 Comprehensive Master Plan that are relevant to this proposal include:

Land Use

LU.1.1 Encourage and plan for new development in areas where adequate public services and facilities can be provided efficiently.

LU.1.1.3 Require new development to provide certified, stamped studies demonstrating the impact proposed development will have on existing infrastructure and to provide improvements and/or funding in lieu of improvements in proportion to the impacts of the proposed projects on the city's roadway, sewer and water systems.

L.U.1.2 Encourage new development to be in accordance with the Comprehensive Master Plan land use category, and other land use controls to accomplish community principles.

LU.1.2.1 Consistently monitor development applications that intend to utilize the underlying zoning. Modify the Fernley Development Code as necessary to ensure compatible development that reflects the community goals envisioned in the Comprehensive Master Plan.

LU.1.4 Ensure existing and future land uses are compatible.

LU.1.4.2 Projects shall be evaluated with the intent to promote land use compatibility; community design measures can increase compatibility among adjoining land uses.

- LU.1.4.5 Require development plans to address conditions unique to the developing area and minimize impacts to adjacent properties.
- LU.1.4.6 Review all projects in relation to their geographic location, impacts to adjacent communities, fiscal impact and mitigation measures to protect natural and cultural resources. Apply specific conditions of approval tailored for each development proposal.

The proposed project is consistent with the master plan land use. The development code is the primary tool used to implement the master plan. The I (Industrial) zoning classification is an equivalent zoning for site based on the land use plan.

As development projects are considered in conjunction with the master plan, decision makers must weight each goal and policy as it relates to an individual development. Projects may not necessarily meet each and every goal or policy in the Comprehensive Master Plan but should be in substantial conformance plan. Decision makers have discretion to determine which goals and policies are more pertinent to a development project based on individual circumstances.

CU2. The application, as submitted and conditioned, is compatible with the existing or permitted uses of adjacent properties.

SURROUNDING LAND USES & ZONING		
North:	Industrial (Vacant)	I
East:	Heavy Industrial	I
South:	Industrial (Vacant)	I
	Industrial (Vacant)	I
West:	General Industrial	I
	Industrial (Vacant)	I

The proposed industrial use is a permitted use within the I (Industrial) zoning district. Nevada Revised Statutes 278.147 requires a Conditional Use Permit for facilities where an explosive, a highly hazardous substance, or other hazardous substances are used, manufactured, processed, transferred, or stored. The purpose of the Conditional Use Permit is to promote *“the public health, safety and general welfare by providing for special safeguards in the location and design of certain uses in certain zoning districts.”* A Conditional Use Permit is a discretionary permit requiring a decision-making body to exercise judgment prior to its approval, conditional approval, or denial. The process encourages public review and evaluation of a proposed use’s operating characteristics and/or site development features and is intended to ensure that proposed conditional uses will not have a significant adverse impact on surrounding uses or the community-at-large.

The proposed project is located in an area that has long been designated for industrial uses. Proximity to Interstate 80 and the Union Pacific Railroad mainline track makes the area suitable for industrial development. The project site is also located in proximity to the city’s downtown. The downtown area is located approximately 1,000 feet to the south of the project site and south of the railroad tracks.

The Planning Commission may determine whether the project as proposed and conditioned is or is not compatible with the existing or permitted uses of adjacent properties based on whether the project mitigates identified impacts to surrounding properties, particularly the city's downtown.

CU3. The potential impairment of natural resources and the total population which the available natural resources will support without unreasonable impairment has been considered.

This is a conditional use permit to construct a lithium-ion battery recycling plant. The area located for the development is in the industrial zone in the north west section of Fernley. The area is designated for industrial development which ensures a distant proximity from any current or future residential developments. The potential impairment of natural resources and the total population which available natural resources will support without unreasonable impairments was considered in conjunction with the 2018 Comprehensive Master Plan update.

CU4. The availability of and need for affordable housing in the community, including affordable housing that is accessible to persons with disabilities has been considered.

This is a Conditional Use Permit for the development of a lithium-ion battery recycling plant. The entire plant will consist of three (3) functional building areas; the three building spaces include a production building, an office building with laboratories, and a warehouse. The purpose of the Project is to demonstrate commercialized deployment of ABMC'S closed-loop technology platform that recycles lithium-ion battery materials. Since this construction is not contingent to the creation of affordable housing for persons with or without disabilities. However, the creation of this plant has the likelihood of job creation which in turn can be great stimulation for the local economy.

CU5. The application, as submitted and conditioned, will address identified impacts.

The project as conditioned will ensure adequate public facilities are provided in timely, orderly, and efficient manner to support the development. All sewer, water, drainage, and transportation facilities shall be reviewed and approved prior to the approval building permit.

Traffic

According to the traffic study conducted this development will not have a major impact on the major ingresses or egresses located around the site.

Hydrology

A hydrology study was conducted for the American Battery project and the on-site hydrology shows that the proposed collection system can collect and retain all the runoff generated by the development.

Sewer

In accordance with the master plan all Industrial developments are required to connect to the city's sewer system.

Design Standards

Prior to the issuance of any building permit for the project, the applicant must demonstrate the project complies with the parking requirements listed in §32.09.120 of the development code. As well as the construction of another access road to the site.

Chemicals

The facility must comply with state and federal regulatory agencies when storing and working with hazardous chemicals.

CU6. The health and safety of the residents of the city, county, or region.

For the health and safety of our residents of the city, county, and region the city has conditioned this application that the developer shall comply with all requirements of any federal, state, or local agency with jurisdiction over the project to the approval of the administrator.

CU7. The safety and security of any military installation in the city, county, or region

There are no military installations in the city, county, or region.

CU8. Public notice was given, and a public hearing held per the requirements of the Development Code and Nevada Revised Statutes.

Public notice was given, a public hearing was scheduled and The Planning Commission and City Council meetings function as public hearings for this matter as required in the City's Municipal Code and Nevada Revised Statutes.

Pursuant to Section 3 of the Declaration of Emergency Directive 006 the requirement contained in NRS 241.023(1)(b) that there be a physical location designated for meetings of public bodies where members of the public are permitted to attend and participate has been suspended until further notice. Also suspended in Section 3 of Directive 006, are the requirements contained in NRS 241.020(4)(a) that public notice agendas be posted at physical locations within the State of Nevada. To view the entire Declaration of Emergency Directive 006 please visit.

ATTACHMENTS

1. Conditions of Approval
2. Vicinity Map
3. Civil Drawings
4. Architectural
5. Landscaping
6. Photometrics
7. On-site Chemical Inventory (Preliminary)